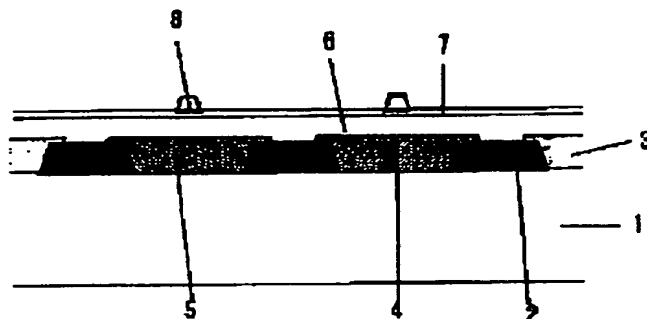


## Patent Abstracts of Japan

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**INVENTOR** : NONAKA HARUKI;  
  
**INT.CL.** : G02F 1/1337 G02B 5/20 G09F 9/35  
  
**TITLE** : SUBSTRATE FOR DIVIDED  
 ALIGNMENT AND LIQUID CRYSTAL  
 DISPLAY DEVICE USING THE  
 SUBSTRATE



**ABSTRACT** : **PROBLEM TO BE SOLVED:** To make it possible to embody a good display characteristic and wide visual field angle by constituting projections formed on a substrate surface for the purpose of divided alignment of at least fillers and resin.

**SOLUTION:** The projections are formed by preparing a paste for the projections formed by mixing and dispersing at least the fillers and the resin and applying this paste on the substrate and subjecting the coating to patterning after drying. These fillers are inorg. and org. particles having the insoluble nature to the resin forming the projections and the solvent and developer thereof. The weight ratio of the fillers and the resin is preferably 3:7 to 9:1. A black matrix 2 is formed by using a black paste on non-alkali glass 1. Blue colored layers 3 are formed so as to fill the apertures of this black matrix 2. Red colored layers 4 and green colored layers 5 are similarly formed. A transparent protective layer 6 is formed and further a transparent conductive layer 7 are laminated. The projections 8 for divided alignment are formed on the transparent conductive layer 7.

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